## ABSTRACT:

A processing device and method for an error adjustment system for equalizing transmission characteristics of N signal processing circuitries according to N signal branches (N>1) are disclosed. An original complex IQ signal of a signal branch of N signal branches and a processed real signal of the signal branch are received. A processed complex IQ signal of the signal branch is calculated from the processed real signal and the original complex IQ signal of the signal branch. Then, a difference between the processed complex IQ signal and the original complex IQ signal is calculated. Finally, control values of a correction function of the signal branch are calculated on the basis of the calculated difference. The calculated control values are supplied to the correction function of the signal branch and supplying operations are performed for all N signal branches.